

WHAT IS CLAIMED IS:

1. A method for preventing formation of sludge in a subsurface cavity having particulate laden fluid disposed therein, comprising:

5 positioning a downhole device having a fluid agitator into the fluid of the subsurface cavity; and
agitating the fluid using the fluid agitator.

2. The method of Claim 1, and further comprising
10 removing the fluid from the subsurface cavity using the downhole device.

3. The method of Claim 1, and further comprising removing the fluid from the subsurface cavity through the
15 downhole device while the fluid is agitated by the fluid agitator.

4. The method of Claim 1, wherein the fluid agitator comprises a plurality of arms that are outwardly
20 extendable.

5. The method of Claim 4, wherein agitating the fluid comprises rotating the arms at a rate of no more than ten revolutions per day.

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6. The method of Claim 4, wherein agitating the fluid comprises rotating the arms at a rate of no more than five revolutions per day.

7. The method of Claim 4, wherein agitating the fluid comprises rotating the arms at a rate of no more than one revolution per day.

5 8. The method of Claim 1, wherein the fluid agitator comprises a plurality of blunt arms that are outwardly extendable.

9. A method for preventing formation of sludge in a subsurface cavity, comprising:

positioning an inlet of a pump via a well bore into a cavity formed underground, the cavity including fluid
5 and a plurality of particles in the fluid;
agitating the fluid; and
removing the fluid.

10. The method of Claim 9, wherein the inlet of the
10 pump is coupled to a plurality of arms that are operable to extend radially within the cavity, and wherein agitating the fluid comprises extending the arms and rotating the arms about a longitudinal axis of the pump.

15 11. The method of Claim 10, wherein agitating the fluid comprises rotating the arms at a rate of no more than ten revolutions per day.

20 12. The method of Claim 10, wherein agitating the fluid comprises rotating the arms at a rate of no more than five revolutions per day.

25 13. The method of Claim 10, wherein agitating the fluid comprises rotating the arms at a rate of no more than one revolution per day.

14. The method of Claim 9, wherein the inlet of the pump is coupled to a plurality of blunt arms that are operable to extend radially within the cavity, and wherein agitating the fluid comprises extending the blunt
5 arms and rotating the blunt arms about a longitudinal axis of the pump.

15. The method of Claim 9, wherein the act of removing the fluid is performed while agitating the
10 fluid.

16. The method of Claim 9, wherein the pump is a suction-rod pump.

15 17. The method of Claim 9, wherein the pump is a downhole pump.

18. A method for removing particulate laden fluid from a subterranean zone, comprising:

lowering an inlet of a pump through a well bore into
5 a cavity formed in a subterranean zone, the cavity extending radially from the well bore;

radially extending within the cavity a plurality of arms coupled to the pump inlet;

positioning the inlet in the cavity by resting the
10 arms on a floor of the cavity;

collecting particulate laden fluid in the cavity;

rotating the arms about a longitudinal axis of the pump; and

removing the particulate laden fluid with the pump.
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19. The method of Claim 18, wherein the arms are rotated at a rate of no more than ten revolutions per day.

20 20. The method of Claim 18, wherein each of the arms are blunt.